Preliminary Classification:

Proposed Class:

Subclass:

NOTE: "All applicants are requested to include a preliminary classification on newly filed patent applications. The preliminary classification, preferably class and subclass designations, should be identified in the upper right-hand comer of the letter of transmittal accompanying the application papers, for example 'Proposed Class 2, subclass 129.' " M.P.E.P. § 601, 7th ed.

## IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

**Box Patent Application Assistant Commissioner for Patents** Washington, D.C. 20231

#### NEW APPLICATION TRANSMITTAL

Transmitted herewith for filing is the patent application of

Inventor(s): KRUER, Thomas R.; THOMPSON, Hugh A.

WARNING: 37 C.F.R. § 1.41(a)(1) points out:

"(a) A patent is applied for in the name or names of the actual inventor or inventors.

"(1) The inventorship of a nonprovisional application is that inventorship set forth in the oath or declaration as prescribed by § 1.63, except as provided for in § 1.53(d)(4) and § 1.63(d). If an oath or declaration as prescribed by § 1.63 is not filed during the pendency of a nonprovisional application, the inventorship is that inventorship set forth in the application papers filed pursuant to § 1.53(b), unless a petition under this paragraph accompanied by the fee set forth in § 1.17(i) is filed supplying or changing the name or names of the inventor or inventors."

For (title):

PROCESS FOR A UNITIZED MAT TO FACILITATE GROWING PLANTS

### CERTIFICATION UNDER 37 C.F.R. §§ 1.8(a) and 1.10\*

(When using Express Mail, the Express Mail label number is mandatory; Express Mail certification is optional.)

I hereby certify that, on the date shown below, this correspondence is being:

#### MAILING

	deposited with the United States Postal Service Patents, Washington, D.C. 20231	vice in an envelope addressed to the Assistant Commissioner	
	37 C.F.R. § 1.8(a)	37 C.F.R. § 1.10 *	
	with sufficient postage as first class mail.	as "Express Mail Post Office to Addressee"	
		Mailing Label No (mandatory)	
	TE	RANSMISSION	
	facsimile transmitted to the Patent and Trademark Office, (703)		
		Signature	
Da	te:	John S. Egbert	
		(type or print name of person certifying)	

(New Application Transmittal [4-1]-page 1 of 14)

following thereceive did PTO listed

<sup>\*</sup> Only the date of filing (§ 1.6) will be the date used in a patent term adjustment calculation, although the date on any certificate of mailing or transmission under § 1.8 continues to be taken into account in determining timeliness. See § 1.703(f). Consider "Express Mail Post Office to Addressee" (§ 1.10) or facsimile transmission (§ 1.6(d)) for the reply to be accorded the earliest possible filing date for patent term adjustment calculations.

<b>1.</b> Typ	e of Application
This	new application is for a(n)
	(check one applicable item below)
	Original (nonprovisional)
	Design
	☐ Plant
WARNI	NG: Do not use this transmittal for a completion in the U.S. of an International Application under 35 U.S.C. § 371(c)(4), unless the International Application is being filed as a divisional, continuation or continuation-in-part application.
WARNI	NG: Do not use this transmittal for the filing of a provisional application.
NOTE:	If one of the following 3 items apply, then complete and attach ADDED PAGES FOR NEW APPLICATION TRANSMITTAL WHERE BENEFIT OF A PRIOR U.S. APPLICATION CLAIMED and a NOTIFICATION IN PARENT APPLICATION OF THE FILING OF THIS CONTINUATION APPLICATION.
X	Divisional. of 10/439,416
	Continuation.
	Continuation-in-part (C-I-P).
2. Ben	efit of Prior U.S. Application(s) (35 U.S.C. §§ 119(e), 120, or 121)
	A nonprovisional application may claim an invention disclosed in one or more prior filed copending nonprovisional applications or copending international applications designating the United States of America. In order for a nonprovisional application to claim the benefit of a prior filed copending nonprovisional application or copending international application designating the United States of America, each prior application must name as an inventor at least one inventor named in the later filed nonprovisional application and disclose the named inventor's invention claimed in at least one claim of the later filed nonprovisional application in the manner provided by the first paragraph of 35 U.S.C. § 112. Each prior application must also be:
	(i) An international application entitled to a filing date in accordance with PCT Article 11 and designating the United States of America; or
	(ii) Complete as set forth in § 1.51(b); or
	(iii) Entitled to a filing date as set forth in $\S$ 1.53(b) or $\S$ 1.53(d) and include the basic filing fee set forth in $\S$ 1.16; or
	(iv) Entitled to a filing date as set forth in § 1.53(b) and have paid therein the processing and retention fee set forth in § 1.21(l) within the time period set forth in § 1.53(f).

37 C.F.R. § 1.78(a)(1).

NOTE: If the new application being transmitted is a divisional, continuation or a continuation-in-part of a parent case, or where the parent case is an International Application which designated the U.S., or benefit of a prior provisional application is claimed, then check the following item and complete and attach ADDED PAGES FOR NEW APPLICATION TRANSMITTAL WHERE BENEFIT OF PRIOR U.S. APPLICATION(S) CLAIMED.

WARNING: If an application claims the benefit of the filing date of an earlier filed application under 35 U.S.C. §§ 120, 121 or 365(c), the 20-year term of that application will be based upon the filing date of the earliest U.S. application that the application makes reference to under 35 U.S.C. §§ 120, 121 or 365(c). (35 U.S.C. § 154(a)(2) does not take into account, for the determination of the patent term, any application on which priority is claimed under 35 U.S.C. §§ 119, 365(a) or 365(b).) For a c-i-p application, applicant should review whether any claim in the patent that will issue is supported by an earlier application and, if not, the applicant should consider canceling the reference to the earlier filed application. The term of a patent is not based on a claim-by-claim approach. See Notice of April 14, 1995, 60 Fed. Reg. 20,195, at 20,205.

(New Application Transmittal [4-1]—page 2 of 14)

WARNING: 37 C.F.R. § 1.78 Claiming benefit of earlier filing date and cross-references to other application.

(2) Except for a continued prosecution application filed under § 1.53(d), any nonprovisional application claiming the benefit of one or more prior filed copending nonprovisional applications or international applications designating the United States of America must contain a reference to each such prior application, identifying it by application number (consisting of the series code and serial number) or international application number and international filing date and indicating the relationship of the applications. This reference must be submitted during the pendency of the application, and within the later of four months from the actual filing date of the application or sixteen months from the filing date of the prior application. This time period is not extendable. Unless the reference required by this paragraph is included in an application data sheet (§ 1.76), the specification must contain or be amended to contain such reference in the first sentence following the title. If the application claims the benefit of an international application, the first sentence of the specification must include an indication of whether the international application was published under PCT Article 21(2) in English (regardless of whether benefit for such application is claimed in the application data sheet). The request for a continued prosecution application under § 1.53(d) is the specific reference required by 35 U.S.C. 120 to the prior application. The identification of an application by application number under this section is the specific reference required by 35 U.S.C. 120 to every application assigned that application number. Cross references to other related applications may be made when appropriate (see § 1.14). Except as provided in paragraph (a)(3) of this section, the failure to timely submit the reference required by 35 U.S.C. 120 and this paragraph is considered a waiver of any benefit under 35 U.S.C. 120, 121, or 365(c) to such prior application. The time period set forth in this paragraph does not apply to an application for a design patent." Emphasis added

The new application being transmitted claims the benefit of prior U.S. application(s). Enclosed are ADDED PAGES FOR NEW APPLICATION TRANSMITTAL WHERE BENEFIT OF PRIOR U.S. APPLICATION(S) CLAIMED.

### Papers Enclosed

A.	Required for filing date under 37 C.F.R. § 1.53(b) (Regular) or 37 C.F.R. § 1.1	153
	(Design) Application	

- 26 Pages of specification
- 8 Pages of claims
- 10 Sheets of drawing

WARNING: DO NOT submit original drawings. A high quality copy of the drawings should be supplied when filing a patent application. The drawings that are submitted to the Office must be on strong, white, smooth, and non-shiny paper and meet the standards according to § 1.84. If corrections to the drawings are necessary, they should be made to the original drawing and a high-quality copy of the corrected original drawing then submitted to the Office. Only one copy is required or desired. For comments on proposed then-new 37 C.F.R. § 1.84, see Notice of March 9, 1988 (1990 O.G.

NOTE: "Identifying indicia, if provided, should include the application number or the title of the invention. inventor's name, docket number (if any), and the name and telephone number of a person to call if the Office is unable to match the drawings to the proper application. This information should be placed on the back of each sheet of drawing a minimum distance of 1.5 cm. (% inch) down from the top of the page . . ." 37 C.F.R. § 1.84(c)).

(complete the following, if applicable)

The enclosed drawing(s)	e photograph(s).	
	(New Application Transmittal [4-1]—page 3 of 1	4)

NOTE: 37 C.F.R. 1.84

"(b) Photographs.

"(1) Black and white. Photographs, including photocopies of photographs, are not ordinarily permitted in utility and design patent applications. The Office will accept photographs in utility and design patent applications, however, if photographs are the only practicable medium for illustrating the claimed invention. For example, photographs or photomicrographs of: electrophoresis gels, blots (e.g., immunological, western, Southern, and northern), auto radiographs, cell cultures (stained and unstained), histological tissue cross sections (stained and unstained), animals, plants, in vivo imaging, thin layer chromatography plates, crystalline structures, and, in a design patent application, ornamental effects, are acceptable. If the subject matter of the application admits of illustration by a drawing, the examiner may require a drawing in place of the photograph. The photographs must be of sufficient quality so that all details in the photographs are reproducible in the printed patent.

"(2) Color photographs. Color photographs will be accepted in utility and design patent applications if the conditions for accepting color drawings and black and white photographs have been satisfied. See paragraphs (a)(2) and (b)(1) of this section."

The enclosed drawing(s) are in color. Three (3) sets of color drawings and a "PETITION TO ACCEPT COLOR DRAWING(S)" are attached. 37 C.F.R. §§ 1.84(a)(2) and 1.84(b).

NOTE: 37 C.F.R. 1.84(a)

4.

claims.)

"(2) Color. On rare occasions, color drawings may be necessary as the only practical medium by which to disclose the subject matter sought to be patented in a utility or design patent application or the subject matter of a statutory invention registration. The color drawings must be of sufficient quality such that all details in the drawings are reproducible in black and white in the printed patent. Color drawings are not permitted in international applications (see PCT Rule 11.13), or in an application, or copy thereof, submitted under the Office electronic filing system. The Office will accept color drawings in utility or design patent applications and statutory invention registrations only after granting a petition filed under this paragraph explaining why the color drawings are necessary. Any such petition must include the following:

- (i) The fee set forth in § 1.17(h);
- (ii) Three (3) sets of color drawings;
- (iii) A black and white photocopy that accurately depicts, to the extent possible, the subject matter shown in the color drawing; and
- (iv) An amendment to the specification to insert (unless the specification contains or has been previously amended to contain) the following language as the first paragraph of the brief description of the drawings:

The patent or application file contains at least one drawing executed in color. Copies of this patent or patent application publication with color drawing(s) will be provided by the Office upon request and payment of the necessary fee."

			and payment of the necessary fee."
		for	mal
		info	ormal
B.	Oth	er F	Papers Enclosed
		<u>7</u> P	ages of declaration and power of attorney (as copied from the
	_1	_P	ages of abstract parent nonprovisional)
		0	other
Α	dditi	onal	papers enclosed
		Am	nendment to claims
			Cancel in this applications claims before calculating the filing fee. (At least one original independent claim must be retained for filing purposes.)
			Add the claims shown on the attached amendment. (Claims added have been numbered consecutively following the highest numbered original

æ	K	Preliminary Amendment				
		Information Disclosure Statement (37 C.F.R. § 1.98)				
	]	Form PTO-1449 (PTO/SB/08A and 08B)				
		Citations				
	כ	Declaration of Biological Deposit				
	)	Submission of "Sequence Listing," computer readable copy and/or amendment pertaining thereto for biotechnology invention containing nucleotide and/or amino acid sequence.				
		Authorization of Attorney(s) to Accept and Follow Instructions from Representative				
	]	Special Comments				
k	k	Other Application Data Sheet				
<b>5.</b> Dec	lara	ation or oath (including power of attorney)				
th bj ap th bj de pe		newly executed declaration is not required in a continuation or divisional application provided that the prior nonprovisional application contained a declaration as required, the application being filed is a full or fewer than all the inventors named in the prior application, there is no new matter in the oplication being filed, and a copy of the executed declaration filed in the prior application (showing the signature or an indication thereon that it was signed) is submitted. The copy must be accompanied or a statement requesting deletion of the names of person(s) who are not inventors of the application and filed. If the declaration in the prior application was filed under § 1.47, then a copy of that accompanied by a copy of the decision granting § 1.47 status or, if a nonsigning for son under § 1.47 has subsequently joined in a prior application, then a copy of the subsequently decuted declaration must be filed. See 37 C.F.R. §§ 1.63(d)(1)–(3).				
is o abi coi		declaration filed to complete an application must be executed, identify the specification to which it directed, identify each inventor by full name including family name and at least one given name, without breviation together with any other given name or initial, and the residence, post office address and untry or citizenship of each inventor, and state whether the inventor is a sole or joint inventor. 37 F.R. § 1.63(a)(1)–(4).				
as as is th		ne inventorship of a nonprovisional application is that inventorship set forth in the oath or declaration prescribed by § 1.62, except as provided for in § 1.53(d)(4) and § 1.63(d). If an oath or declaration prescribed by § 1.63 is not filed during the pendency of a nonprovisional application, the inventorship hat inventorship set forth in the application papers filed pursuant to § 1.53(b), unless a petition under a paragraph accompanied by the fee set forth in § 1.17(i) is filed supplying or changing the name names of the inventor or inventors." 37 C.F.R. § 1.41(a)(1).				
. 🗵	]	Enclosed				
		Executed by				
		(check all applicable boxes)				
		☑ inventor(s).				
	-	legal representative of inventor(s). 37 C.F.R. §§ 1.42 or 1.43.				
	l	joint inventor or person showing a proprietary interest on behalf of inventor who refused to sign or cannot be reached.				
		☐ This is the petition required by 37 C.F.R. § 1.47 and the statement required by 37 C.F.R. § 1.47 is also attached. See item 13 below for fee.				
		Not Enclosed.				
	the may	ere the filing is a completion in the U.S. of an International Application or where the completion of U.S. application contains subject matter in addition to the International Application, the application y be treated as a continuation or continuation-in-part, as the case may be, utilizing ADDED PAGE R NEW APPLICATION TRANSMITTAL WHERE BENEFIT OF PRIOR U.S. APPLICATION CLAIMED.				

	Application is made by a person authorized under 37 C.F.R. § 1.41(c) of behalf of all the above named inventor(s).	חכ
(The decla	ation or oath; along with the surcharge required by 37 C.F.R. §-1.16(e) can be filed subsequently).	
	☐ Showing that the filing is authorized.  (not required unless called into question. 37 C.F.R. § 1.41(d))	
6. Inventorsh	ip Statement	
o	the named inventors are each not the inventors of all the claims an explanation, including to vinership of the various claims at the time the last claimed invention was made, should be britted.	
The invento	ship for all the claims in this application are:	
⊠ The	same.	
	or	
	the same. An explanation, including the ownership of the various claims time the last claimed invention was made,	at
	is submitted.	
	will be submitted.	
7. Language		
An En require	lication including a signed oath or declaration may be filed in a language other than English translation of the non-English language application and the processing fee of \$130. If you will be some some some some some some some som	00
⊠ En	ilish	
□ No	n-English	
	The attached translation includes a statement that the translation is acc rate. 37 C.F.R. § 1.52(d).	u-
8. Assignme	nt	
☐ An	assignment of the invention to	
	is attached. A separate ☐ "COVER SHEET FOR ASSIGNMENT (DOC! MENT) ACCOMPANYING NEW PATENT APPLICATION" or ☐ FORM PT 1595 is also attached.	
	will follow.	
	ssignment is submitted with a new application, send two separate letters-one for the applicati e for the assignment." Notice of May 4, 1990 (1114 O.G. 77-78).	on
	newly executed "CERTIFICATE UNDER 37 C.F.R. § 3.73(b)" must be filed when a continuation part application is filed by an assignee. Notice of April 30, 1993, 1150 O.G. 62-64.	)N-
☐ Thi	s is a   continuation   divisional application and the assignment	
do	ument for the parent application 0 / was filed	
on	<del></del>	
	Reel	—
	Frame	

(New Application Transmittal [4-1]—page 6 of 14)

Certified copy(ies) of application	cation(s)			
Country	Appln.	No.		Filed
Country	Appln.	No.		Filed
Country	Appln.	No.	<u> </u>	· Filed
from which priority is claimed	d			
☐ is (are) attached.				
☐ will follow.				
NOTE: The foreign application for declaration. 37 C.F.R. §		claim for	priority must	be referred to in the oath or
U.S. application or Interna § 120 is itself entitled to μ	ntional Application from priority from a prior forei	which this	s application cl ation, then con	directly relates. If any paren aims benefit under 35 U.S.C. aplete item 18 on the ADDEL PRIOR U.S. APPLICATION(S
10. Fee Calculation (37 C.	F.R. § 1.16)			
A.	n			
	CLAIMS AS	FILED		
Number filed	Number Ex	tra	Rate	Basic Fee 37 C.F.R. § 1.16(a) \$ 770
Total Claims (37 C.F.R. § 1.16(c)) –	20 =	×	\$ 18.00	
Independent				
Claims (37 C.F.R. 2 § 1.16(b)) –	3 =	×	\$ 84.00	
Multiple dependent claim(s), if any (37 C.F.R. § 1.16(d))		+	\$280.00	
☐ Amendment cance	elling extra claims	is enclo	sed.	
Amendment deleti	ng multiple-depend	dencies	is enclosed	l <b>.</b>
Fee for extra clain	ns is not being pai	id at thi	s time.	
NOTE: If the fees for extra claims a prior to the expiration of a notice of fee deficiency.	the time period set for			ms cancelled by amendment, and Trademark Office in any
nonde of the deficiency.	Filing Fee Calcula	tion		\$
B. ☐ Design application (\$330.00—37 C.F.	1			

Filing Fee Calculation

9. Certified Copy

C. I	Ш	Plant application	
		(\$510.00—37 C.F.R. § 1.16(g))	·
		Filing fee calculation	\$

### 11. Assertion of Small Entity Status

Applicant hereby asserts status as a small entity under 37 C.F.R. § 1.27

NOTE: 37 C.F.R. § 1.27(c) deals with the assertion of small entity status, whether by a written specific declaration thereof or by payment as a small entity of the basic filing fee or the fee for the entry into the national phase and states:

- "(c) Assertion of small entity status. Any party (person, small business concern or nonprofit organization) should make a determination, pursuant to paragraph (f) of this section, of entitlement to be accorded small entity status based on the definitions set forth in paragraph (a) of this section, and must, in order to establish small entity status for the purpose of paying small entity fees, actually make an assertion of entitlement to small entity status, in the manner set forth in paragraphs (c)(1) or (c)(3) of this section, in the application or patent in which such small entity fees are to be paid.
  - (1) Assertion by writing. Small entity status may be established by a written assertion of entitlement to small entity status. A written assertion must:
    - (i) Be clearly identifiable:
    - (ii) Be signed (see paragraph (c)(2) of this section); and
    - (iii) Convey the concept of entitlement to small entity status, such as by stating that applicant is a small entity, or that small entity status is entitled to be asserted for the application or patent. While no specific words or wording are required to assert small entity status, the intent to assert small entity status must be clearly indicated in order to comply with the assertion requirement.
  - (2) Parties who can sign and file the written assertion. The written assertion can be signed by:
    - (i) One of the parties identified in § 1.33(b) (e.g., an attorney or agent registered with the Office), § 3.73(b) of this chapter notwithstanding, who can also file the written assertion;
    - (ii) At least one of the individuals identified as an inventor (even though a § 1.63 executed oath or declaration has not been submitted), notwithstanding § 1.33(b)(4), who can also file the written assertion pursuant to the exception under § 1.33(b) of this part; or
    - (iii) An assignee of an undivided part interest, notwithstanding §§ 1.33(b)(3) and 3.73(b) of this chapter, but the partial assignee cannot file the assertion without resort to a party identified under § 1.33(b) of this part.
- (3) Assertion by payment of the small entity basic filing or basic national fee. The payment, by any party, of the exact amount of one of the small entity basic filing fees set forth in §§ 1.16(a), (f), (g), (h), or (k), or one of the small entity basic national fees set forth in §§ 1.492(a)(1), (a)(2), (a)(3), (a)(4), or (a)(5), will be treated as a written assertion of entitlement to small entity status even if the type of basic filing or basic national fee is inadvertently selected in error.
  - (i) If the Office accords small entity status based on payment of a small entity basic filing or basic national fee under paragraph (c)(3) of this section that is not applicable to that application, any balance of the small entity fee that is applicable to that application will be due along with the appropriate surcharge set forth in § 1.16(e), or § 1.16(f).
  - (ii) The payment of any small entity fee other than those set forth in paragraph (c)(3) of this section (whether in the exact fee amount or not) will not be treated as a written assertion of entitlement to small entity status and will not be sufficient to establish small entity status in an application or a patent."

a n a ti c a	37 C.F.R. § 1.27(c)(4): "Assertion required in related, continuing, and reas a small entity must be specifically established by an assertion in eacreissue application in which status is appropriate and desired. Status application or patent does not affect the status of any other application the relationship of the applications or patents. The refiling of an application, divisional, or continuation-in-part application (including application under § 1.53(d)), or the filing of a reissue application, requirecontinued entitlement to small entity status for the continuing or reissue	th related, continuing and as a small entity in one or patent, regardless of cation under § 1.53 as a continued prosecution res a new assertion as to
	"Small entity status must not be established when the person or persons scan <b>unequivocally</b> make the required self-certification." M.P.E.P., § 50	
	(complete the following, if applicable)	•
☐ Sta	atus as a small entity was asserted in the prior applicat	ion
	/, filed on	, from which benefit
is	being claimed for this application under:	
3	35 U.S.C. §	
	and which status as a small entity is still proper and ass	serted for this
	A copy of the written assertion of small entity filed in is included.	the prior application
establ for a i	and based on establishment of small entity status, of a portion of fees lishing status as a small entity may only be obtained if an assertion unde refund of the excess amount are filed within three months of the date all fee. The three-month time period is not extendable under § 1.136.	er § 1.27(c) and a request of the timely payment of
Fill	ling Fee Calculation (50% of A, B or C above)	385
	\$	
12. Request	t for International-Type Search (37 C.F.R. § 1.104(d))	
	(complete, if applicable)	
	ease prepare an international-type search report for this aphen national examination on the merits takes place.	oplication at the time

13.	Fe	е	Payr	nent Being Made at This Time			
		]	Not	Enclosed			
				No filing fee is to be paid at this time. (This and the surcharge required by 37 C.F.R. § 1.10 subsequently.)	6(e)	can be	e paid
	[	xł	Enc	losed		205	
			$\mathbf{x}$	Filing fee	\$.	385	
				Recording assignment (\$40.00; 37 C.F.R. § 1.21(h)) (See attached "COVER SHEET FOR ASSIGNMENT ACCOMPANYING NEW APPLICATION".)	\$ .	•	
				Petition fee for filing by other than all the inventors or person on behalf of the inventor where inventor refused to sign or cannot be reached (\$130.00; 37 C.F.R. §§ 1.47 and 1.17(i))	\$ .		
				For processing an application with a specification in a non-English language (\$130.00; 37 C.F.R. §§ 1.52(d) and 1.17(k))	\$ .		
				Processing and retention fee (\$130.00; 37 C.F.R. §§ 1.53(d) and 1.21(l))	\$ .	-	
				Fee for international-type search report (\$40.00; 37 C.F.R. § 1.21(e))	\$.		
NC	TE:	fai 37 eit	iling to C.F.I her ti	R. § 1.21(f) establishes a fee for processing and retaining any application of complete the application pursuant to 37 C.F.R. § 1.53(f) and this, as versely 1.53 and 1.78(a)(1), indicate that in order to obtain the benefit of a see basic filing fee must be paid, or the processing and retention fee of § 1.53 year from notification under § 53(f).	vell as prior 3 1.21	s the cha. U.S. appi	nges to lication,
				Total fees enclosed \$_		<del></del>	
14.	₩e	eth	od d	of Payment of Fees			
		]		ched is a check money order in the amount of \$			
	2	3	Auti	norization is hereby made to charge the amount of $\frac{3}{2}$	885		
				to Deposit Account No. 08-0879			
			X	to Credit card as shown on the attached credit card infortion form PTO-2038.	mati	on auth	oriza-
WA	ARNI	NG:	: Cre	edit card information should <b>not</b> be included on this form as it may bed	come	public.	
	K	)		rge any additional fees required by this paper or credit ne manner authorized above.	any	overpa	yment
				A duplicate of this paper is attached.			

15. Au	itho	rization to Charge Additional Fees			
WARNI	NG:	If no fees are to be paid on filing, the following items should not be completed.			
WARNI	NG:	Accurately count claims, especially multiple dependent claims, to avoid unexpected high charges if extra claim charges are authorized.			
2	The Office is hereby authorized to charge, in the manner shown above, the following additional fees that may be required by this paper and during the entipendency of this application.				
	8	37 C.F.R. § 1.16(a), (f) or (g) (filling fees)			
		37 C.F.R. § 1.16(b), (c) and (d) (presentation of extra claims)			
NOTE:	mus set to a	ause additional fees for excess or multiple dependent claims not paid on filing or on later presentation to only be paid or these claims cancelled by amendment prior to the expiration of the time period for response by the PTO in any notice of fee deficiency (37 C.F.R. § 1.16(d)), it might be best no uthorize the PTO to charge additional claim fees, except possibly when dealing with amendments or final action.			
	[	37 C.F.R. § 1.16(e) (surcharge for filing the basic filing fee and/or declaration on a date later than the filing date of the application)			
		37 C.F.R. § 1.17(a)(1)-(5) (extension fees pursuant to § 1.136(a)).			
		☐ 37 C.F.R. § 1.17 (application processing fees)			
NOTE:	or fu as ii chai con: an e § 1. requ	A written request may be submitted in an application that is an authorization to treat any concurrent ature reply, requiring a petition for an extension of time under this paragraph for its timely submission accorporating a petition for extension of time for the appropriate length of time. An authorization to a get all required fees, fees under § 1.17, or all required extension of time fees will be treated as a structive petition for an extension of time in any concurrent or future reply requiring a petition for extension of time under this paragraph for its timely submission. Submission of the fee set forth in 17(a) will also be treated as a constructive petition for an extension of time in any concurrent reply living a petition for an extension of time under this paragraph for its timely submission." 37 C.F.R. 136(a)(3).			
		37 C.F.R. § 1.18 (issue fee at or before mailing of Notice of Allowance pursuant to 37 C.F.R. § 1.311(b))			
NOTE:	of a	ere an authorization to charge the issue fee to a deposit account has been filed before the mailing.  Notice of Allowance, the issue fee will be automatically charged to the deposit account at the time nailing the notice of allowance. 37 C.F.R. § 1.311(b).			
NOTE:	entit fee. ever	C.F.R. § 1.28(b) requires "Notification of any change in status resulting in loss of entitlement to small by status must be filed in the application prior to paying, or at the time of paying, the issue" From the wording of 37 C.F.R. § 1.28(b), (a) notification of change of status must be made if the fee is paid as "other than a small entity" and (b) no notification is required if the change of another small entity.			
16. Ins	truc	ctions as to Overpayment			
NOTE:	a rea	. Amounts of twenty-five dollars or less will not be returned unless specifically requested within asonable time, nor will the payer be notified of such amounts; amounts over twenty-five dollars may eturned by check or, if requested, by credit to a deposit account." 37 C.F.R. § 1.26(a).			
2	) (	Credit Account No. 08-0879			
	) F	Refund			

Reg. No. 30,627

Tel. No. ( ) 713-224-8080

Customer No. 24106

SIGNATURE OF PRACTITIONER

John S. Egbert

(type or print name of attorney)
Harrison & Egbert
412 Main St., 7th Floor

P.O. Address

Houston, Texas 77002

لسبا		polation by reference of added pages
	pi st th	check the following item if the application in this transmittal claims the benefit of rior U.S. application(s) (including an international application entering the U.S. lage as a continuation, divisional or C-I-P application) and complete and attached a ADDED PAGES FOR NEW APPLICATION TRANSMITTAL WHERE BENEFIT OF RIOR U.S. APPLICATION(S) CLAIMED)
	X	Plus Added Pages for New Application Transmittal Where Benefit of Prior U.S. Application(s) Claimed 7
		Number of pages added
☐ Plus Added P		Plus Added Pages for Papers Referred to in Item 4 Above
		Number of pages added
		Plus added pages deleting names of inventor(s) named in prior application(s) who is/are no longer inventor(s) of the subject matter claimed in this application.
		Number of pages added
		Plus "Assignment Cover Letter Accompanying New Application"
		Number of pages added
$\mathbf{x}$	State	ment Where No Further Pages Added
		no further pages form a part of this Transmittal, then end this Transmittal with is page and check the following item)
	X	This transmittal ends with this page.

Practitioner's	Docket	No.	1819

PATENT

# ADDED PAGES FOR APPLICATION TRANSMITTAL WHERE BENEFIT OF PRIOR U.S. APPLICATION(S) CLAIMED

NOTE: See 37 C.F.R. § 1.78.

#### 17. Relate Back

WARNING: If an application claims the benefit of the filing date of an earlier filed application under 35 U.S.C. § 120, 121 or 365(c), the 20-year term of that application will be based upon the filing date of the earliest U.S. application that the application makes reference to under 35 U.S.C. § 120, 121 or 365(c). (35 U.S.C. § 154(a)(2) does not take into account, for the determination of the patent term, any application on which priority is claimed under 35 U.S.C. § 119, 365(a) or 365(b).) For

a c-l-p application, applicant should review whether any claim in the patent that will issue is supported by an earlier application and, if not, the applicant should consider canceling the reference to the earlier filed application. The term of a patent is not based on a claim-by-claim approach. See Notice of April 14, 1995, 60 Fed. Reg. 20,195, at 20,205.

(complete the following, if applicable)

Amend the specification by inserting, before the first line, the following sentence:

# 35 11 S C & 440/0\

M. J	D 0.3.C. 9 119(e)
NOTE:	"Any nonprovisional application claiming the benefit of one or more prior filed copending provisional applications must contain or be amended to contain in the first sentence of the specification following the title a reference to each such prior provisional application, identifying it as a provisional application, and including the provisional application number (consisting of series code and serial number)." 37 C.F.R. § 1.78(a)(5).
	"This application claims the benefit of U.S. Provisional Application(s) No(s).:
	APPLICATION NO(S).: FILING DATE

## B. 35 U.S.C. Sections 120, 121 and 365(c)

**WARNING:** 37 C.F.R. § 1.78 Claiming benefit of earlier filing date and cross-references to other application. "(a) \* \* \*

(2) Except for a continued prosecution application filed under § 1.53(d), any nonprovisional application claiming the benefit of one or more prior filed copending nonprovisional applications or international applications designating the United States of America must contain a reference to each such prior application, identifying it by application number (consisting of the series code and serial number) or international application number and international filing date and indicating the relationship of the applications. This reference must be submitted during the pendency of the application, and within the later of four months from the actual filing date of the application or sixteen months from the filing date of the prior application. This time period is not extendable. Unless the reference required by this paragraph is included in an application data sheet (§ 1.76), the specification must contain or be amended to contain such reference in the first sentence following the title. If the application claims the benefit of an international application, the first sentence of the specification must include an indication of whether the international application was published under PCT Article 21(2) in English (regardless of whether benefit for such application is claimed in the application data sheet). The request for a continued prosecution application under § 1.53(d) is the specific reference required by 35 U.S.C. 120 to the prior application. The identification of an application by application number under this section is the specific reference required by 35 U.S.C. 120 to every application assigned that application number. Cross references to other related applications may be made when appropriate (see § 1.14). Except as provided in paragraph (a)(3) of this section, the failure to timely submit the reference required by 35 U.S.C. 120 and this paragraph is considered a waiver of any benefit under 35 U.S.C. 120, 121, or 365(c) to such prior application. The time period set forth in this paragraph does not apply to an application for a design patent." (Emphasis added).

$\mathbf{x}$	"Th	"This application is a					
		continuation					
		continuation-in-part					
	X	☑ divisional					
of co	oenc	fing application(s)		M =	16 2002		
	X	☑ application number 0 / 10 / 439, 416	_ filed on .	мау	16,2003		
		International Applicationwhich designated the U.S."	filed on _		ar	nd	
		The international application was published (37 C.F.R. § 1.78(a)(2))	under PCT	Article	21(2) in Englis	sh	
NOTE	E: 77 se	he proper reference to a prior filed PCT application that crial number and the filing date of the PCT application ti	entered the U. hat designated	S. nation	nal phase is the U.	S.	
NOTE	th	) Where the application being transmitted adds subject in the filing can be as a continuation-in-part or (2) if it is desired an be as a continuation.	matter to the li ed to do so foi	nternation other re	nal Application, the assons then the fili	en ng	
NOTE	:: TI	he deadline for entering the national phase in the U.S. for	or an internatio	nal appl	ication was clarifi	ed	

in the Notice of April 28, 1987 (1079 O.G. 32 to 46) as follows:

"The Patent and Trademark Office considers the International application to be pending until the 22nd month from the priority date if the United States has been designated and no Demand for International Preliminary Examination has been filed prior to the expiration of the 19th month from the priority date and until the 32nd month from the priority date if a Demand for International Preliminary Examination which elected the United States of America has been filed prior to the expiration of the 19th month from the priority date, provided that a copy of the international application has been communicated to the Patent and Trademark Office within the 20 or 30 month period respectively. If a copy of the international application has not been communicated to the Patent and Trademark Office within the 20 or 30 month period respectively, the international application becomes abandoned as to the United States 20 or 30 months from the priority date respectively. These periods have been placed in the rules as paragraph (h) of § 1.494 and paragraph (l) of § 1.495. A continuing application under 35 U.S.C. 365(c) and 120 may be filed anytime during the pendency of the international application."

(Added Pages for Application Transmittal Where Benefit of Prior U.S. Application(s) Claimed [4-1.4]
—page 2 of 7)

	"The nonprovisional application de	signated above, namely application
	Provisional Application(s) No(s).:	, claims the benefit of U.S.
	APPLICATION NO(S).:	FILING DATE
	/	29
	/	99
WARNING	3: 37 C.F.R. § 1.78 Claiming benefit of earlier filing	g date and cross-references to other application.
	specification must include an indication of whethe	international application, the first sentence of the or the international application was published under the benefit for such application is claimed in the
	Please indicate in the first sentence of	the application:
"The in	ternational application corresponding to t	
	was	
	was not	
published	under PCT Article 21(2) in the English la	anguage."
	Where more than one reference is made into one sentence.	_
18. Rela	te Back—35 U.S.C. § 119 Priority Clair	n for Prior Application
NOTE: 3	7 C.F.R. § 1.55 Claim for foreign priority.	, paradicin
	"(a) An applicant in a nonprovisional application more prior foreign applications under the condition (f), 172, and 365(a) and (b).	nay claim the benefit of the filing date of one or ns specified in 35 U.S.C. 119(a) through (d) and
	(1)(i) In an original application filed under 35 U.S.C during the pendency of the application, and with date of the application or sixteen months from th time period is not extendable. The claim must ideclaimed, as well as any foreign application for the before that of the application for which priority is country (or intellectual property authority), day, managraph does not apply to an application for a	in the later of four months from the actual filing the filing date of the prior foreign application This tentify the foreign application for which priority is the same subject matter and having a filing date to claimed, by specifying the application number, both, and year of its filing. The time period in this
	compliance with 35 U.S.C. 3/1, the claim for pr	I stage from an international application after riority must be made during the pendency of the In the PCT and the Regulations under the PCT."
	(2) The claim for priority and the certified copy o	

the priority claim unless corrected by a certificate of correction under 35 U.S.C. 255 and § 1.323.

(Added Pages for Application Transmittal Where Benefit of Prior U.S. Application(s) Claimed [4-1.4]

—page 3 of 7)

119(b) or PCT Rule 17 must, in any event, be filed before the patent is granted. If the claim for priority or the certified copy of the foreign application is filed after the date the issue fee is paid, it must be accompanied by the processing fee set forth in § 1.17(i), but the patent will not include

The prior U.S. application(s), including any prior International Application designating the U.S., identified above in item 17B, in turn itself claim(s) foreign priority(ies) as follows:

Countr		Appin. No.	Filed
The cert	ified copy(ies) has (have)	-	
	been filed onwhich was filed on	, in prior application 0 /	
	is (are) attached.		
WARNING	the International Bureau may not be application in the continuing application communicated by the a U.S. serial number unless the natic stage is not entered. Therefore, su prosecution of a continuing application documents from the folders and transfer, retrieve the foldernament and make a record of such counter and make a record of such counters and make a record of such counters and make a record of such counters are such as a such a	pplication that may have been communication without any need to file a certification. This is so because the certification of the second stage is entered. Such folders are disject certified copies may not be available ation. An alternative would be to physication. An alternative would be to physication. The second state of the continuing application are supplies in the Continuing Application are supplied in the continuing application that have not a famile 28, 1987 (1079 O.G. 32 to 46,	fied copy of the priority of copy of the priority or and is not assigned aposed of if the national or if needed later in the ally remove the priority offer the certified copies, obstantial. Accordingly, of entered the national
19. Main	tenance of Copendency of I	Prior Application	
re	e PTO finds it useful if a copy of the sponse is filed with the papers cons evember 5, 1985 (1060 O.G. 27).	e petition filed in the prior application e stituting the filing of the continuation a	extending the term for application. Notice of
A. 🗆	Extension of time in prior app	olication	•
(This ite	·	ne papers filed <b>in the prior app</b> prior application has run.)	<b>lication</b> , if the
	A petition, fee and response until	extends the term in the pending	prior application
	A copy of the petition filed in	prior application is attached.	
В. □	Conditional Petition for Exten	sion of Time in Prior Application	n
	(complete this item, it	f previous item not applicable)	
	<ul> <li>A conditional petition for eapplication.</li> </ul>	extension of time is being filed in	the pending prior
	☐ A copy of the conditiona	I petition filed in the prior applic	ation is attached.
(A	dded Pages for Application Transmit	tal Where Benefit of Prior U.S. Applicat	tion(s) Claimed [4-1.4] —page 4 of 7)

20.	rura	ner i	nventorship Statement Where Benefit of Prior Application(s) Claimed	
			(complete applicable item (a), (b) and/or (c) below)	
(a)	<b>⊠</b>	s application discloses and claims only subject matter disclosed in the prior dication whose particulars are set out above and the inventor(s) in this dication are		
		$\mathbf{x}$	the same.	
			less than those named in the prior application. It is requested that the following inventor(s) identified for the prior application be deleted:	
			(type name(s) of inventor(s) to be deleted)	
(b)	(b)  This application discloses and claims additional disclosure by amendment an a new declaration or oath is being filed. With respect to the prior application the inventor(s) in this application are			
			the same.	
			the following additional inventor(s) have been added:	
			(type name(s) of inventor(s) to be deleted)	
(c)	X	The	inventorship for all the claims in this application are	
		X	the same.	
			not the same. An explanation, including the ownership of the various claims at the time the last claimed invention was made	
			is submitted.	
			will be submitted.	
21.	Abar	idon	ment of Prior Application (if applicable)	
		pen is g	ase abandon the prior application at a time while the prior application is ding, or when the petition for extension of time or to revive in that application ranted, and when this application is granted a filing date, so as to make this lication copending with said prior application.	
NOTE	pa re	art app vive a	ing to the Notice of May 13, 1983 (103, TMOG 6-7), the filing of a continuation or continuation-in- polication is a proper response with respect to a petition for extension of time or a petition to and should include the express abandonment of the prior application conditioned upon the prof the petition and the granting of a filing date to the continuing application.	
		ion ndm	for Suspension of Prosecution for the Time Necessary to File an ent	
WARNING: "The claims of a new application may be finally rejected in the first Office action in those situations where (A) the new application is a continuing application of, or a substitute for, an earlier application, and (B) all the claims of the new application (1) are drawn to the same invention claimed in the earlier application, and (2) would have been properly finally rejected on the grounds of art of record in the next Office action if they had been entered in the earlier application." M.P.E.P. § 706.07(b), 7th ed.				
NOTE	an	d for s	t is possible that the claims on file will give rise to a first action final for this continuation application some reason an amendment cannot be filed promptly (e.g., experimental data is being gathered) be desirable to file a petition for suspension of prosecution for the time necessary.	
			(check the next item, if applicable)	
			provided herewith a Petition To Suspend Prosecution for the Time Necessary in Amendment (New Application Filed Concurrently)	
			Pages for Application Transmittal Where Benefit of Prior U.S. Application(s) Claimed [4-1.4] —page 5 of 7)	

23. Small Entity (37 C.F.R. § 1.28(a))	
Applicant has established small entity application/_	status by the filing of a statement in parent on
☐ A copy of the statement previously	filed is included.
WARNING: See 37 C.F.R. § 1.28(a).	
<b>WARNING:</b> "Small entity status must not be established can unequivocally make the required self-added).	when the person or persons signing the statement certification." M.P.E.P. § 509.03, 7th ed. (emphasis
24. NOTIFICATION IN PARENT APPLICATION	ON OF THIS FILING
☐ A notification of the filing of this	
(check one of th	e following)
continuation	
continuation-in-part	
☐ divisional	
is being filed in the parent application, from whi U.S.C. § 120.	ch this application claims priority under 35

. . . . .